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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/828,409	04/20/2004	Paul Mills	11033-065001 / A10871US	5534
26161	7590	09/07/2005	EXAMINER	
FISH & RICHARDSON PC P.O. BOX 1022 MINNEAPOLIS, MN 55440-1022			EVANISKO, LESLIE J	
			ART UNIT	PAPER NUMBER
			2854	

DATE MAILED: 09/07/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

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<b>Office Action Summary</b>	<b>Application No.</b> 10/828,409	<b>Applicant(s)</b> MILLS, PAUL	
	<b>Examiner</b> Leslie J. Evanisko	<b>Art Unit</b> 2854	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 13 June 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-17,20-24 and 26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-4,6,20,21 and 26 is/are allowed.
- 6) ☒ Claim(s) 24 is/are rejected.
- 7) ☐ Claim(s) 5,7-17,22 and 23 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 04/20/04 & 06/13/05 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### **DETAILED ACTION**

#### ***Priority***

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

#### ***Drawings***

2. The replacement sheet of drawings was received on June 13, 2005. These drawings have been approved by the Examiner.

#### ***Claim Objections***

3. Claims 5, 7-17, and 22-23 objected to because of the following informalities:

With respect to claim 5, it is not clear if claim 5 is providing some further limitation to already recited relationship in claim 1, since claim 1 has now been amended to recite that the spindle of the ribbon transport device moves relative to the supporting structure in a direction transverse to the axis of the spindle.

With respect to claim 7, similar to claim 5, it is not clear whether the language of claim 7 is providing some further limitation to already recited language in claim 6. In particular, note that claim 6 has been amended to recite that each of the sensors provide an input to a controller which controls the operation of the ribbon transport mechanism in response.

With respect to claim 9, it is suggested that the terms “deter” in line 1 and “mines” in line 2 be deleted and replaced with --determines-- to correct an obvious typographical error. Similarly, it is suggested that the term “a” and “mount” in line 3 be deleted and replaced with --amount--. Finally, the term “and/or” is not clear in meaning and has been interpreted as being “or”.

With respect to claim 10, the language “the first the second or” in line 1 is awkward and unclear.

With respect to claim 13, it is suggested that the term “the” in line 1 be deleted and replaced with --each-- since claim 6 recites a plurality of sensor devices.

With respect to claim 15, the phrase “or is structure” at the end of the claim has no clear meaning.

With respect to claim 16, it is suggested that the term “includes” in line 1 be deleted and replaced with --including-- to use the more appropriate form of the word. Additionally, claim 16 lacks a period at the end of the claim.

With respect to claim 22, the claim contains two periods--one at the end of the claim and one at the end of line 10.

Appropriate correction and/or clarification is required.

***Allowable Subject Matter***

4. Claims 1-4, 6, 20-21, and 26 are allowed.

5. Claims 5, 7-17, and 22-23 are objected to for the reasons set forth above, but would be allowable if rewritten to overcome those objections to the satisfaction of the Examiner.

6. The indicated allowability of claim 24 is withdrawn in view of the newly discovered reference(s) to Nelson et al. (US 5,975,777). Rejections based on the newly cited reference(s) follow.

7. The following is a statement of reasons for the indication of allowable subject matter:

Note the previous statements regarding the allowability of claims 6, 20, 22, and 26 set forth in the Office Action dated March 11, 2005.

Additionally, with respect to claim 1, note that applicant's arguments in the amendment filed June 13, 2005, with respect to claims 1-5 in particular, have been fully considered and are persuasive. Therefore, the prior art rejection of claims 1-5 has been withdrawn and the claims are allowable.

***Claim Rejections - 35 USC § 102***

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

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(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

9. Claim 24 is rejected under 35 U.S.C. 102(b) as being anticipated by Nelson et al. (US 5,975,777). Nelson et al. teaches an apparatus for controlling a ribbon transport mechanism of a ribbon feed system which includes a supporting structure (i.e., cassette structure described in column 4, lines 16-17 and lines 45-47) supporting a plurality of ribbon transport devices including a ribbon storage spool 11, 51 a ribbon take-up spool 12, 52 and at least one ribbon guide 18, 58 around which the ribbon 13, 53 is passed, there being a ribbon feed path (described in column 4, lines 15-25) including the ribbon guide 18, 58 between the storage 11, 51 and take-up spools 12, 52 through an operating station 14, 54 where a work operation is carried out which utilizes the ribbon, the ribbon transport mechanism, in use, transporting the ribbon along the ribbon feed path between the storage and take-up spools, the ribbon guide being a roller 18, 58 of a roller assembly, wherein the roller carries a magnet (column 7, lines 7-8 and column 8, lines 55-57) and rotation of the roller is sensed by a sensor (column 7, line 8-10 and column 8, lines 57-61). See, column 6, line 58 through column 7, line 20 and column 8, line 54 through column 9, line 24 in particular. Additionally, note Nelson et al. teach the sensed rotations of roller 18, 58 is provided to a control means to calculate the amount of ribbon passing the roller as the ribbon is paid out from the storage spool in column 8, lines 54-61. Furthermore, with respect to the

functional recitation in the last three lines of the claim, since Nelson et al. teach all of the structure of the apparatus as recited, the apparatus of Nelson et al. is capable of performing the recited function of determining the amount of ribbon on each of the supply and take-up spools and thereby meets the claim language as recited.


### ***Conclusion***

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Leslie J. Evanisko** whose telephone number is **(571) 272-2161**. The examiner can normally be reached on M-Th 7:30 am-6:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew H. Hirshfeld can be reached on (571) 272-2168. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Leslie J. Evanisko  
Primary Examiner  
Art Unit 2854

lje  
September 6, 2005